

# 3Växel system requirements

Compliance with the system requirements in this document is required to get full functionality, stability and high quality in the 3Växel service. Please also note that older operating systems and hardware are gradually phased out.

---

## 3Växel app in smartphone and tablet

The 3Växel app is available for iOS and Android in smartphones and tablets. For iOS, the two latest, official iOS-versions are supported. For Android, the app supports the three latest official Android-versions on Samsung Galaxy, Sony Xperia and Google Pixel 2. We recommend **iOS 14** and **Android 10** when new devices are purchased. The life time for older versions are expected to be relatively short. Huawei P40 and Mate XS, Huawei Mobile Services, Huawei App Galley as well as Windows Mobile are not supported.

---

## 3Växel web in computer

The 3Växel web (3vaxel.tre.se) for e.g. PBX admin and settings supports the following web versions:

- Mozilla Firefox 54 and later
  - Safari 10 and later
  - Google Chrome 60 and later
  - Microsoft Internet Explorer 11 and Chromium Edge 80 or later
- 

## 3Växel Softphone and IP-desk phones (IP-telephony)

The 3Växel Softphone in computer and IP-desk phones use IP-telephony (telephony via IP / Internet-access).

### General system requirements for 3Växel IP-telephony

- Please reserve at least 100 kbit/ s in both directions per call. (G.711 64 kbit/s + IP overhead)
- The corporate network shall be opened for traffic as specified in table further down in this document.

### General system requirements for 3Växel Computer Softphone

- The 3Växel Softphone client is downloaded from the 3Växel web (3vaxel.tre.se).
- The Softphone is installed locally on each computer. Thin clients are not supported.
- 30 MB hard disk memory
- For ACD- and attendant view, at least 1024x768 screen resolution is required.



### System requirements for 3Växel Softphone in PC

- Windows 7 and 10 with sound card
- USB Headsets from **Jabra** (verified with UC1-versions of Evolve 75, PRO 930, PRO 9470 or from **Plantronics** (verified with Plantronics Savi 440, Savi W720 M and Voyager Focus UC B825 M)
- Outlook plugin only supports PC and Office 365 or Outlook 2010 and later

### System requirements for 3Växel Softphone in Mac (Intel)

- Intel processor
- The two latest, official operating system versions, currently Mojave and Catalina
- USB Headsets from **Plantronics** (verified with Plantronics Savi 440, Savi W720 M and Voyager Focus UC B825 M). (Jabra is not supported for Mac)

---

## The corporate network shall be open for the following traffic:

Source	Destination IP/host	Protocol	Port	Application	Protocol
Customer NW	80.251.192.32/27*	HTTP	80	Webb	TCP
Customer NW	80.251.192.32/27*	HTTPS	443	Alla applikationer	TCP
Customer NW	80.251.192.32/27*	SIP/TLS	5061	Alla SIP-enheter	TCP
Customer NW	80.251.192.32/27*	SIP/UDP	5060	Alla SIP-enheter	UDP
Customer NW	80.251.192.32/27*	SIP/TCP	5060	Alla SIP-enheter	TCP
Customer NW	80.251.192.32/27*	STUN	5060	Alla SIP-enheter	UDP
Customer NW	80.251.192.32/27*	RTP/RTCP	49152-65535	Alla SIP-enheter	UDP
Customer NW	80.251.192.32/27*	NTP	123	IP-telefoner och IP-DECT	UDP

\*or 80.251.192.41--59

\*\*or 80.251.192.40--58

---

## Internet capacity for 3Växel

Internet capacity shall be reserved for 3Växel services. This is of highest importance if the network is used for IP-telephony (computer softphones and/or IP desk phones). We recommend that other services using high bandwidth, e g video or file transfer are not used over the IP-connection used for 3Växel. Internet connection via a foreign office shall not be used.

---

## Sound files in 3Växel

It is possible to upload sound files on 3Växel web to be used e g for welcome greetings, queue messages, e t c. 3Växel supports sound files in the following formats: **WAV- or AIFF-format, 16-bit signed PCM**. WAV 32-bit float PCM format **is not** supported. For editing of sound files, the freeware program Audacity is recommended (available for Internet download).

